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EXAMINER	
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Please find below and/or attached an Office communication concerning this application or proceeding.

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BEFORE THE BOARD OF PATENT APPEALS AND INTERFERENCES

Application Number: 10/752,709
Filing Date: January 08, 2004
Appellant(s): HAYES, JOHN H.

Jeffrey D. Sanok
For Appellant

EXAMINER'S ANSWER

This is in response to the appeal brief filed 04/03/09 appealing from the Office action mailed 10/16/07.

(1) Real Party in Interest

A statement identifying by name the real party in interest is contained in the brief.

(2) Related Appeals and Interferences

The examiner is not aware of any related appeals, interferences, or judicial proceedings which will directly affect or be directly affected by or have a bearing on the Board's decision in the pending appeal.

(3) Status of Claims

The statement of the status of claims contained in the brief is correct.

(4) Status of Amendments After Final

The appellant's statement of the status of amendments after final rejection contained in the brief is correct.

(5) Summary of Claimed Subject Matter

The summary of claimed subject matter contained in the brief is correct.

(6) Grounds of Rejection to be Reviewed on Appeal

The appellant's statement of the grounds of rejection to be reviewed on appeal is correct.

(7) Claims Appendix

The copy of the appealed claims contained in the Appendix to the brief is correct.

(8) Evidence Relied Upon

4,947,500	SEILER	8-1990
6,253,401	BOYD	7-2001

4,867,140 HOVIS ET AL. 9-1989

(9) Grounds of Rejection

The following ground(s) of rejection are applicable to the appealed claims:

Claims 1-3, 5, and 7-8 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Pat. No. 4,947,500 to Seiler in view of U.S. Pat. No. 6,253,401 to Boyd.

Claims 1 and 8, Seiler discloses a mattress system, comprising:

a mattress (1,2,3) having a top surface defined by an upper strip 3 and a bottom surface defined by a base layer 1;

a cavity arranged in the mattress, the cavity being open at least toward the top surface and having a defined size;

an expandable cushion (4-9) arranged in the cavity;

a mattress protector (19,20) covering at least the top surface of the mattress, the protector including a first portion defined by an insert 19 that extends into the cavity and a second portion defined by a cover layer 20 that extends over the expandable cushion arranged in the cavity; and

a control system 17 operatively coupled with the cushion to control an expansion and contraction of the cushion, wherein the control system includes a fluidic pump 18 arranged to pump fluid into the expandable cushion, a fluid relief mechanism arranged to allow fluid to escape the expandable cushion (col. 3-4 lines 66-68 & 1-10), and a the control system defining a fluid pressure switch operable to automatically maintain a defined pressure level in the expandable cushion during a given cycle (col. 4 lines 11-

21). Seiler fails to disclose the control system maintaining the pressure within the cushion. Boyd discloses a control system that maintains the pressure within a cushion (col. 2-3 lines 66-67 & 1-13). It would have been obvious for one having ordinary skill in the art at the time of the invention to employ a control system as taught by Boyd in order for the user to conveniently maintain desired pressures (col. 3 lines 12-13).

Claim 2, wherein the fluid is air, and wherein a control switch is provided to control an inflation and deflation of the expandable cushion.

Claim 3, wherein the control switch is inherently an electric control switch.

Claim 5, wherein the fluid is air.

Claim 7, wherein the fluid relief mechanism allows the fluid to escape the expandable cushion to maintain the defined pressure level.

Claims 4 and 6 are rejected under 35 U.S.C. 103(a) as being unpatentable over U.S. Pat. No. 4,947,500 to Seiler in view of U.S. Pat. No. 6,253,401 to Boyd as applied to claim 1, and further in view of U.S. Pat. No. 4,867,140 to Hovis et al.

With regards to claims 4 and 6, Seiler, as modified, discloses all of the Applicant's claimed limitations except for a reservoir and the fluid being a liquid. Hovis discloses an inflatable device having a reservoir 62 and employing a liquid (col.. 2 lines 65-68). It would have been obvious for one having ordinary skill in the art at the time of the invention to employ a reservoir and liquid as taught by Hovis in order to pressurize the system of Seiler.

(10) Response to Argument

The control system as recited in the Applicant's claim is comprised of a fluidic pump arranged to pump fluid into the expandable cushion, a fluid relief mechanism arranged to allow fluid to escape the expandable cushion, and a fluid pressure switch operable to automatically maintain a defined pressure level in the expandable cushion. As stated in the rejection, a control system of Seiler is defined by a control device 17 that is operatively coupled with the cushion to control an expansion and contraction of the cushion, wherein the control system includes a fluidic pump 18 arranged to pump fluid into the expandable cushion, a fluid relief mechanism arranged to allow fluid to escape the expandable cushion (col. 3-4 lines 66-68 & 1-10), and a the control system defining a fluid pressure switch operable to automatically maintain a defined pressure level in the expandable cushion during a given cycle since "the control device serves the purpose of selecting the desired or required pumping and operating cycle as well as for inserting pauses of programmable duration of up to 30 minutes between the individual steps of the cycle, as well as for freely choosing the times for inflation and deflation, suitable values for these times having been found to be in the range of 1 to 3 minutes and preferably between 2 and 3 minutes" as explicitly recited by Seiler (col. 4 lines 11-21). The control system of Seiler is silent to maintaining the pressure within the cushion. However, Boyd discloses a control system that is capable of maintaining the pressure within a cushion. Boyd explicitly recites that "the control 31 includes a gauge 41 for measuring the air pressure supplied by the pump to the various air chambers. The gauge has associated therewith a display 43 for displaying the measured pressure.

It should be appreciated that the measured pressure may vary from chamber to chamber as desired by the user. The pressure for the various chambers may be measured sequentially as each chamber is inflated or, alternatively, separate gauges may be associated with each chamber to simultaneously measure the pressure in each chamber. The display, in this latter case, may display the measured pressures sequentially, or a larger display may be used to display all pressures simultaneously. Control 31 preferably includes a memory 45 for recording the desired pressures in each air chamber, so that the user may conveniently re-inflate the chambers to the desired pressures time after time" (col. 2-3 lines 66-67 & 1-13).

In response to applicant's argument that there is no suggestion to combine the references, the examiner recognizes that obviousness can only be established by combining or modifying the teachings of the prior art to produce the claimed invention where there is some teaching, suggestion, or motivation to do so found either in the references themselves or in the knowledge generally available to one of ordinary skill in the art. See In re Fine, 837 F.2d 1071, 5 USPQ2d 1596 (Fed. Cir. 1988) and In re Jones, 958 F.2d 347, 21 USPQ2d 1941 (Fed. Cir. 1992). In this case, both Seiler and Boyd disclose pressurized air mattresses and the ability to control the pressure as taught by Boyd would enhance the therapeutic mattress of Seiler to make specific pressures at any one point of the skin as small as possible and keep adequate higher pressures on the skin within allowable time limits as the patient is moved along the mattress. Both Seiler and Boyd are concerned with providing a comfortable mattress by reducing the pressures at any one point of the skin and having the persons weight

evenly distributed along the supporting surface of the mattress. Seiler addresses this problem by providing a control system by moving the patient periodically and keeping the exposure compatible with the status of their tissues (col. 1 lines 25-35). However, during the 30 minute programmable pauses it is desirable to have the persons weight evenly distributed. Boyd discloses a control system for an air mattress that is repeatedly deflated and inflated and addresses this problem by providing pressure gauges re-inflating the mattress to the same predetermined level thereby providing a more evenly weight distribution (col. 1 lines 48-55). The combination of references would provide a control system having programmable pauses of up to 30 minutes between the individual steps of the cycle, as well as for freely choosing the times for inflation and deflation that is capable of maintaining the pressure within a cushion to a predetermined level as taught by Boyd thereby being capable of maintaining the cushion pressure in accordance with a weight of the user in proportion to a firmness of the mattress such that the persons weight is evenly distributed along the entire supporting surface of the mattress.

Claims are given the broadest reasonable interpretation consistent with the specification and limitations in the specification are not read into the claims. Therefore, the words of a claim are generally given their ordinary and customary meaning. The Appellant's claim relies on broad structural limitations such as a mattress having a top surface and a bottom surface, a cavity arranged in the mattress being open toward the top surface, an expandable cushion in the cavity, a mattress protector covering top surface of the mattress. As stated above Seiler discloses a mattress (1,2,3) having a

top surface defined by an upper strip 3 and a bottom surface defined by a base layer 1; a cavity arranged in the mattress, the cavity being open at least toward the top surface and having a defined size; an expandable cushion (4-9) arranged in the cavity; a mattress protector (19,20) covering at least the top surface of the mattress, the protector including a first portion defined by an insert 19 that extends into the cavity and a second portion defined by a cover layer 20 that extends over the expandable cushion arranged in the cavity. Therefore, the broad structural language that fails to clearly distinguish the present invention over the prior art of record and does no preclude the Examiner from interpreting the claims as stated above. Furthermore, the Appellants own disclosure and claims do not support any structure or structural limitations that have not already been disclosed by the prior art or well known to those having obvious skill in the art. "Section 103 forbids issuance of a patent when 'the differences between the subject matter sought to be patented and the prior art are such
that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains.'" KSR International Co. v. Teleflex Inc., 127 S. Ct. 1727, 1734 (2007). "If a person of ordinary skill can implement a predictable variation, § 103 likely bars its patentability." Id. at 1740.

(11) Related Proceeding(s) Appendix

No decision rendered by a court or the Board is identified by the examiner in the Related Appeals and Interferences section of this examiner's answer.

For the above reasons, it is believed that the rejections should be sustained.

Respectfully submitted,

/FREDRICK C CONLEY/

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/FREDRICK CONLEY/ FCC